

IN THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application:

1. (Withdrawn) An immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant.
2. (Withdrawn) A composition according to claim 1, wherein the antigen is of autologous, heterologous, or chimeric nature.
3. (Withdrawn) A composition according to claim 1, wherein the antigen is a mutant of the molecule.
4. (Withdrawn) A composition according to claim 1, wherein the immunogen is obtained from synthetic, recombinant, or natural sources.
5. (Withdrawn) A composition according to claim 1 wherein the immunogen is administered as part of plasmidic or viral vectors.
6. (Withdrawn) A composition according to claim 1, wherein the adjuvant is selected from the group consistent of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.
7. (Withdrawn) An immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations.

8. (Withdrawn) An immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to the p64K protein.
9. (Withdrawn) An immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant.
10. (Withdrawn) A composition according to claim 9, wherein the antigen is of autologous, heterologous, or chimeric nature.
11. (Withdrawn) A composition according to claim 9, wherein the antigen is a mutant of the molecule.
12. (Withdrawn) A composition according to claim 9 wherein the immunogen is obtained from synthetic, recombinant, or natural sources.
13. (Withdrawn) A composition according to claim 9 wherein the immunogen is administered as part of plasmidic or viral vectors.
14. (Withdrawn) A composition according to claim 9, wherein the adjuvant is selected from the group consistent of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.
15. (Withdrawn) An immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations.
16. (Withdrawn) An immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to the p64K protein.

17. (Withdrawn) An immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant.

18. (Withdrawn) A composition according to claim 17, wherein the antigen is of autologous, heterologous, or chimeric nature.

19. (Withdrawn) A composition according to claim 17, wherein the antigens is a mutant of the molecule.

20. (Withdrawn) A composition according to claim 17, wherein the immunogen is obtained from synthetic, recombinant, or natural sources.

21. (Withdrawn) A composition according to claim 17 wherein the immunogen is administered as part of plasmidic or viral vectors.

22. (Withdrawn) A composition according to claim 17, wherein the adjuvant is selected from the group consistent of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.

23. (Withdrawn) An immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations.

24. (Withdrawn) An immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered associated covalently or not to the p64K protein.

25. (Withdrawn) An immunogenic composition comprising VEGF polypeptides and/or its encoding oligonucleotides, administered in the presence of an adjuvant.

26. (Withdrawn) An immunogenic composition comprising at least two of the preparations described in: (i) an immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant; (ii) an immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations; (iii) an immunogenic composition comprising VEGFR1 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to the p64K protein; (iv) an immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant; (v) an immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations; (vi) an immunogenic composition comprising VEGFR2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to the p64K protein; (vii) an immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant; (viii) an immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations; and (ix) an immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered associated covalently or not to the p64K protein.

27. (Currently Amended) An immunogenic composition comprising VEGF-A, said VEGF-A polypeptide mutated to prevent binding to its receptor and at least a one of the molecules described in:

i) an immunogenic composition comprising VEGFR~~1~~2 polypeptides~~and~~ fragments ~~thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant~~ corresponding to the third extracellular domain;

ii) an immunogenic composition comprising VEGFR~~1~~2 polypeptides~~and~~ fragments corresponding to the third extracellular domain, optionally further comprising ~~thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived~~ very small size particles (VSSP)~~preparations;~~

iii) an immunogenic composition comprising VEGFR~~1~~2 polypeptides~~and~~ fragments corresponding to the third extracellular domain ~~thereof, or its encoding oligonucleotides, administered associated covalently or not to the~~, optionally further comprising a p64K protein or its aminoterminal fragments;

iv) an immunogenic composition comprising VEGFR~~2~~ polypeptides~~and~~ fragments corresponding to the first three extracellular domains~~thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant;~~

v) an immunogenic composition comprising VEGFR~~2~~ polypeptides~~and~~ fragments corresponding to the first three extracellular domains, optionally further comprising a ~~thereof, or its encoding oligonucleotides, administed associated covalently or not to the~~ p64K protein or an aminoterminal fragment thereof; and

~~vi) — an immunogenic composition comprising VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or their encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant;~~

~~administered in the presence or not of optionally further comprising a pharmaceutically accepted adjuvant.~~

28. (Withdrawn) An immunogenic composition comprising a bi-cistronic vector coding for a VEGFR1 or fragments thereof and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

29. (Withdrawn) An immunogenic composition comprising a DNA vector coding for a VEGFR1 or fragments thereof and a DNA vector coding for a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

30. (Withdrawn) An immunogenic composition comprising a fusion protein containing a VEGFR1 or fragments thereof and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

31. (Withdrawn) An immunogenic composition comprising VEGFR1 polypeptide or fragments thereof and a mutant of VEGF polypeptide administered in the presence of incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

32. (Withdrawn) An immunogenic composition comprising a bi-cistronic vector coding for a VEGFR2 or fragments thereof and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

33. (Withdrawn) An immunogenic composition comprising a DNA vector coding for a VEGFR2 or fragments thereof and a DNA vector coding for a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

34. (Withdrawn) An immunogenic composition comprising a fusion protein containing a VEGFR2 or fragments thereof and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

35. (Currently Amended) An immunogenic composition comprising VEGFR2 polypeptide or fragments thereof and a mutant of VEGF polypeptide, said polypeptide mutated to prevent binding to its receptor, administered in the presence of incorporated into *Neisseria meningitidis* outer membrane derived VSSP.

36. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising immunogenic VEGFR1 polypeptides and fragments thereof or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant for the treatment of disorders associated to an increment of angiogenesis.

37. (Withdrawn) Method of claim 36 wherein the immunogen is of autologous, heterologous, or chimeric nature.

38. (Withdrawn) Method of claim 36 wherein the immunogen is a mutant of the molecule.

39. (Withdrawn) Method of claim 36 wherein the immunogen is obtained from synthetic, recombinant, or natural sources.

40. (Withdrawn) Method of claim 36 wherein the immunogen is administered as part of plasmidic or viral vectors.

41. (Withdrawn) Method of claim 36 wherein the adjuvant is selected from the group consisting of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.

42. (Withdrawn) Method of claim 36 wherein the immunogenic composition comprise VEGFR1 polypeptides and fragments thereof or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

43. (Withdrawn) Method of claim 36 wherein the immunogenic composition comprise VEGFR1 polypeptides and fragments thereof or its encoding oligonucleotides, administered associated covalently or not to the p64K protein.

44. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising VEGFR2 polypeptides and fragments thereof or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant for the treatment of disorders associated to an increment of angiogenesis.

45. (Withdrawn) Method of claim 44 wherein the immunogen is of autologous, heterologous, or chimeric nature.

46. (Withdrawn) Method of claim 44 wherein the immunogen is a mutant of the molecule.

47. (Withdrawn) Method of claim 44 wherein the immunogen is obtained from synthetic, recombinant, or natural sources.

48. (Withdrawn) Method of claim 44 wherein the immunogen is administered as part of plasmidic or viral vectors.

49. (Withdrawn) Method of claim 44 wherein the adjuvant is selected from the group consisting of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.

50. (Withdrawn) Method of claim 44 wherein the immunogenic composition comprise VEGFR2 polypeptides and fragments thereof or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

51. (Withdrawn) Method of claim 44 wherein the immunogenic composition comprise polypeptides or oligonucleotides coding for the VEGFR2 and fragments thereof, administered associated covalently or not to the p64K protein.

52. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising the VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant for the treatment of disorders associated to an increment of angiogenesis.

53. (Withdrawn) Method of claim 52 wherein the immunogen is of autologous, heterologous, or chimeric nature.

54. (Withdrawn) Method of claim 52 wherein the immunogen is a mutant of the molecule.

55. (Withdrawn) Method of claim 52 wherein the immunogen is obtained from synthetic, recombinant, or natural sources.

56. (Withdrawn) Method of claim 52 wherein the immunogen is administered as part of plasmidic or viral vectors.

57. (Withdrawn) Method of claim 52 wherein the adjuvant is selected from the group consistent of: the recombinant particle of Hepatitis B Core Antigen, the recombinant particle of Hepatitis C Core Antigen, the OPC protein, the KLH protein, Freund adjuvant or its derivatives, and Montanide ISA 51.

58. (Withdrawn) Method of claim 52 wherein the immunogenic composition comprise VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

59. (Withdrawn) Method of claim 52 wherein the immunogenic composition comprise VEGFR3, NRP-1 or NRP-2 polypeptides and fragments thereof, or its encoding oligonucleotides, administered associated covalently or not to the p64K protein.

60. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising VEGF polypeptides and fragments thereof, or its encoding oligonucleotides, administered in the presence or not of a pharmaceutically accepted adjuvant for the restoration or improvement of immune functions, in immunologically compromised hosts, subjected or not to other disease-oriented vaccination procedures.

61. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition according to claim 26 for the treatment of disorders associated to an increment of angiogenesis.

62. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition according to claim 27 for the treatment of disorders associated to an increment of angiogenesis.

63. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a bi-cistronic vector coding for VEGFR2 or fragments thereof, and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

64. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a DNA vector coding for VEGFR2 or fragments thereof and a DNA vector coding for a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations for the treatment of disorders associated to an increment of angiogenesis.

65. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a fusion protein containing VEGFR2 or fragments thereof and a mutant of VEGF administered in the presence of or incorporated into the *Neisseria meningitidis* outer membrane derived VSSP preparation, for the treatment of disorders associated to an increment of angiogenesis.

66. (Withdrawn) Method for active vaccination comprising administering an immunogenic protein composition comprising VEGFR2 or fragments thereof, and a mutant of VEGF, administered in the presence of incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

67. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a bi-cistronic vector coding for VEGFR1 or fragments thereof, and a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

68. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a DNA vector coding for VEGFR1 or fragments thereof and a DNA vector coding for a mutant of VEGF, administered in the presence of or incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations for the treatment of disorders associated to an increment of angiogenesis.

69. (Withdrawn) Method for active vaccination comprising administering an immunogenic composition comprising a fusion protein containing VEGFR1 or fragments thereof and a mutant of VEGF administered in the presence of or incorporated into the *Neisseria meningitidis* outer membrane derived VSSP preparation, for the treatment of disorders associated to an increment of angiogenesis.

70. (Withdrawn) Method for active vaccination comprising administering an immunogenic protein composition comprising VEGFR1 or fragments thereof, and a mutant of VEGF, administered in the presence of incorporated into *Neisseria meningitidis* outer membrane derived VSSP preparations, for the treatment of disorders associated to an increment of angiogenesis.

71.-79. (cancelled)

80. (Withdrawn) Method according to claim 36, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

81. (Withdrawn) Method according to claim 44, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

82. (Withdrawn) Method according to claim 52, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

83. (Withdrawn) Method according to claim 61, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

84. (Withdrawn) Method according to claim 62, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

85. (Withdrawn) Method according to claim 63, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

86. (Withdrawn) Method according to claim 64, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

87. (Withdrawn) Method according to claim 65, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

88. (Withdrawn) Method according to claim 66, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; or for the treatment of diseases or entities characterized by an increment in the angiogenesis.

89. (Withdrawn) Method according to claim 67, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; for the treatment of diseases or entities characterized by an increment in the angiogenesis; or for the restoration or improvement of immune function, in immunologically compromised hosts, subjected or not to other disease-oriented vaccination procedures.

90. (Withdrawn) Method according to claim 68, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; for the

treatment of diseases or entities characterized by an increment in the angiogenesis; or for the restoration or improvement of immune function, in immunologically compromised hosts, subjected or not to other disease-oriented vaccination procedures.

91. (Withdrawn) Method according to claim 69, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; for the treatment of diseases or entities characterized by an increment in the angiogenesis; or for the restoration or improvement of immune function, in immunologically compromised hosts, subjected or not to other disease-oriented vaccination procedures.

92. (Withdrawn) Method according to claim 70, for the treatment of tumors in mammals; for the treatment and prevention of tumors in humans; for the treatment of diseases or entities characterized by an increment in the angiogenesis; or for the restoration or improvement of immune function, in immunologically compromised hosts, subjected or not to other disease-oriented vaccination procedures.

93. (Withdrawn) Method according to claim 60, for the restoration or improvement of immune function, in immunologically hosts, subjected or not to other disease-oriented vaccination procedures.

94. (Withdrawn) Method according to claim 67, for the restoration or improvement of immune function, in immunologically hosts, subjected or not to other disease-oriented vaccination procedures.

95. (Withdrawn) Method according to claim 68, for the restoration or improvement of immune function, in immunologically hosts, subjected or not to other disease-oriented vaccination procedures.

96. (Withdrawn) Method according to claim 69, for the restoration or improvement of immune function, in immunologically hosts, subjected or not to other disease-oriented vaccination procedures.

97. (Withdrawn) Method according to claim 70, for the restoration or improvement of immune function, in immunologically hosts, subjected or not to other disease-oriented vaccination procedures.

98. (New) The immunogenic composition according to claim 27 wherein said VEGF-A polypeptide is a mutated VEGF₁₂₁ isoform.

99. (New) The immunogenic composition according to claim 35, wherein said mutant of VEGF polypeptide is a mutated VEGF₁₂₁ isoform.

100. (New) The immunogenic composition according to claim 35, wherein said VEGFR2 polypeptide consists essentially of the first to third extracellular domains.